- 5. (Amended) The electric axial flow machine as claimed in claim 1, wherein the fiber- or fabric-reinforced plastic comprises an epoxy resin or an imide resin with glass fiber reinforcement.
- 6. (Amended) The electric axial flow machine as claimed in claim 1, wherein the permanent magnets respectively comprise at least two separate magnet segments next to one another, in a circumferential direction, joined by a metal adhesive.
- 7. (Amended) The electric axial flow machine as claimed in claim 1, wherein the stator comprises an annular yoke including slots extending approximately radially and through which multi-phase windings pass.
- 8. (Amended) The electric axial flow machine as claimed in claim 7, wherein one of the permanent magnets and the slots are transposed in a circumferential direction.
- 9. (Amended) The electric axial flow machine as claimed in claim 1, including two stators electrically offset in relation to one another in a circumferential direction by 180° so that magnetic fluxes in the circumferential direction in the rotor are oppositely oriented and essentially cancel one another.
- 10. (Amended) A method for producing a rotor for an electric axial flow machine as claimed in claim 1, wherein the machine shaft and the permanent magnets are arranged in a mold and a pre-heated fiber- or fabric reinforced plastic is subsequently poured under pressure into the mold, which is heated
- 11. (Amended) The method as claimed in claim 10, including pouring the fiber- or fabric-reinforced plastic at a temperature of at least 200°C and under a pressure of 500 1500 bar.

IN THE ABSTRACT:

Insert the following abstract:

Abstract Of The Disclosure

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An electric axial flow machine includes an ironless disk-shaped rotor arranged on a machine shaft and having permanent magnets embedded in a fiber- or fabric-reinforced plastic, and, on both sides, next to the rotor, a stator, wherein the permanent magnets are each